```
Validated By CRFValidator v 1.0.3
```

Application No: 10622373   Version No: 2.0

Input Set:

Output Set:

Started, Finished, etc.
Validated By CRFValidator v 1.0.3

Application No: 10622373   Version No: 2.0

Input Set:

Output Set:

Started: 2007-12-03 19:02:21.803
Finished: 2007-12-03 19:02:24.017
Elapsed: 0 hr(s) 0 min(s) 2 sec(s) 214 ms
Total Warnings: 5
Total Errors: 0
No. of SeqIDs Defined: 9
Actual SeqID Count: 9

Error code	Error Description
W 402	Undefined organism found in <213> in SEQ ID (3)
W 213	Artificial or Unknown found in <213> in SEQ ID (4)
W 213	Artificial or Unknown found in <213> in SEQ ID (7)
W 213	Artificial or Unknown found in <213> in SEQ ID (8)
W 213	Artificial or Unknown found in <213> in SEQ ID (9)

<400> 1

```
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      gaggttgtag gtggggctga gatagagaat gatgtccctc tggtggtcag acccaaggtt       120
      aggacccagg cccagataat gcctggggca aggcccaaga ataagtccaa ggttatgcct       180
      ggagcaagca ccaaagttga gacaagtgca gtgggtgggg cacgccctaa gagtaaggcc       240
      aaggcaatac ctgtttcacg atttaaggaa gaagcccaga tgtgggctca gcccaggttt       300
      ggtgctgaaa gattgtctaa gacagagaga aactcccaga ccaatatcat agcctctcca       360
      cttgtcagta ctgattctgt cttggttgct aaaacaaagt acctgtctga ggatagagaa       420
      ctggttaata cagacactga gagctttcct agaaggaagg cccattacca gcaggattc       480
      cagccttctt ttaggtcaaa ggaggagacc aatatggggt cctggtgctg tcctaggcct       540
      acatccaaac aagaagcctc tcctaattct gatttcaaat gggtagacaa atctgtgagt       600
      tccttgttct ggagtggaga tgaggtcact gcaaaatttc atcctgggaa tagggtaaaa       660
      gacagtaaca gatccatgca catggccaat caagaggcta ataccatgtc taggtcccaa       720
      actaaccagg agctctatat tgcatctagt tctggttctg aggatgagtc tgttaagaca       780
      ccctggttct gggccagaga taaaaccaat acctggtctg ggcccaggga agatcccaat       840
      agcaggtcca ggtttaggtc taagaaagaa gtctatgttg aatcaagttc tggatctgag       900
      catgaagacc atttggagtc ctggtttggg gctggaaagg agggcaaatt caggtccaaa       960
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      actgaagaag aggccagtat ggggactggg gctagcagta aatccagacc aaggactgat      1380
      ggggagcgta ttggtgattc cttatttggg gctagggaaa agaccagtat gaaaactggg      1440
      gctgaggcca cctctgaatc tatactagca gctgatgatg aacaggtcat tattggttcc      1500
      tggttctggg ctggtgaaga ggtcaaccaa gaggctgagg aagagaccat ttttgggtcg      1560
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      gacaccatgc aagggctga ggaggaggag cccattattg ggtcctggtt ttggaccaga      1860
      gtagaagctt gtgtggaggg tgatgtcaac agcaagtcta gcctggagga caaggaagag      1920
      gccatgatac catgttttgg agccaaagaa gaggtcagta tgaagcatgg gactggtgtc      1980
```

```
agatgcagat ttatggcagg ggctgaggag accaataata agtcttgctt ctgggcagaa     2040
aaagaaccct gtatgtatcc tgccggtgga ggaagttgga agtctaggcc agaggaggaa     2100
gaggacattg tcaattcgtg gttctggtcc agaaaataca caaagccaga ggccattata     2160
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gacaggctag cagctgagaa agaaggtatt gttgggtcct ggtttgggc cagagaagag      2460
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aatattgagc cgcttatttc tgcattccac aaagttgaga aatttgctaa ggaactgcaa     4140
ggcaaaacag acaatcaaaa tgaccctgaa ggggaccaag aaaat                      4185
```

<210> 2
<211> 1404
<212> PRT
<213> Homo sapiens

<400> 2

```
Tyr Trp Thr Phe Phe Val Thr Cys Thr Met Thr Gly Ala Glu Ile Glu
1               5                   10                  15
Ser Gly Ala Gln Val Lys Pro Glu Lys Lys Pro Gly Glu Glu Val Val
                20                  25                  30
Gly Gly Ala Glu Ile Glu Asn Asp Val Pro Leu Val Val Arg Pro Lys
            35                  40                  45
Val Arg Thr Gln Ala Gln Ile Met Pro Gly Ala Arg Pro Lys Asn Lys
        50                  55                  60
Ser Lys Val Met Pro Gly Ala Ser Thr Lys Val Glu Thr Ser Ala Val
65                  70                  75                  80
Gly Gly Ala Arg Pro Lys Ser Lys Ala Lys Ala Ile Pro Val Ser Arg
                85                  90                  95
Phe Lys Glu Glu Ala Gln Met Trp Ala Gln Pro Arg Phe Gly Ala Glu
```

```
                100                         105                         110
Arg Leu Ser Lys Thr Glu Arg Asn Ser Gln Thr Asn Ile Ile Ala Ser
        115                         120                         125
Pro Leu Val Ser Thr Asp Ser Val Leu Val Ala Lys Thr Lys Tyr Leu
    130                         135                         140
Ser Glu Asp Arg Glu Leu Val Asn Thr Asp Thr Glu Ser Phe Pro Arg
145                         150                         155                         160
Arg Lys Ala His Tyr Gln Ala Gly Phe Gln Pro Ser Phe Arg Ser Lys
                165                         170                         175
Glu Glu Thr Asn Met Gly Ser Trp Cys Cys Pro Arg Pro Thr Ser Lys
            180                         185                         190
Gln Glu Ala Ser Pro Asn Ser Asp Phe Lys Trp Val Asp Lys Ser Val
        195                         200                         205
Ser Ser Leu Phe Trp Ser Gly Asp Glu Val Thr Ala Lys Phe His Pro
    210                         215                         220
Gly Asn Arg Val Lys Asp Ser Asn Arg Ser Met His Met Ala Asn Gln
225                         230                         235                         240
Glu Ala Asn Thr Met Ser Arg Ser Gln Thr Asn Gln Glu Leu Tyr Ile
                245                         250                         255
Ala Ser Ser Ser Gly Ser Glu Asp Glu Ser Val Lys Thr Pro Trp Phe
            260                         265                         270
Trp Ala Arg Asp Lys Thr Asn Thr Trp Ser Gly Pro Arg Glu Asp Pro
        275                         280                         285
Asn Ser Arg Ser Arg Phe Arg Ser Lys Lys Glu Val Tyr Val Glu Ser
    290                         295                         300
Ser Ser Gly Ser Glu His Glu Asp His Leu Glu Ser Trp Phe Gly Ala
305                         310                         315                         320
Gly Lys Glu Gly Lys Phe Arg Ser Lys Met Arg Ala Gly Lys Glu Ala
                325                         330                         335
Asn Asn Arg Ala Arg His Arg Ala Lys Arg Glu Ala Cys Ile Asp Phe
            340                         345                         350
Met Pro Gly Ser Ile Asp Val Ile Lys Lys Glu Ser Cys Phe Trp Pro
        355                         360                         365
Glu Glu Asn Ala Asn Thr Phe Ser Arg Pro Met Ile Lys Lys Glu Ala
    370                         375                         380
Arg Ala Arg Ala Met Thr Lys Glu Glu Ala Lys Thr Lys Ala Arg Ala
385                         390                         395                         400
Arg Ala Lys Gln Glu Ala Arg Ser Glu Glu Glu Ala Leu Ile Gly Thr
                405                         410                         415
Trp Phe Trp Ala Thr Asp Glu Ser Ser Met Ala Asp Glu Ala Ser Ile
            420                         425                         430
Glu Ser Ser Leu Gln Val Glu Asp Glu Ser Ile Ile Gly Ser Trp Phe
        435                         440                         445
Trp Thr Glu Glu Glu Ala Ser Met Gly Thr Gly Ala Ser Ser Lys Ser
    450                         455                         460
Arg Pro Arg Thr Asp Gly Glu Arg Ile Gly Asp Ser Leu Phe Gly Ala
465                         470                         475                         480
Arg Glu Lys Thr Ser Met Lys Thr Gly Ala Glu Ala Thr Ser Glu Ser
                485                         490                         495
Ile Leu Ala Ala Asp Asp Glu Gln Val Ile Ile Gly Ser Trp Phe Trp
            500                         505                         510
Ala Gly Glu Glu Val Asn Gln Glu Ala Glu Glu Glu Thr Ile Phe Gly
        515                         520                         525
Ser Trp Phe Trp Val Ile Asp Ala Ala Ser Val Glu Ser Gly Val Gly
    530                         535                         540
Val Ser Cys Glu Ser Arg Thr Arg Ser Glu Glu Glu Glu Val Ile Gly
545                         550                         555                         560
```

Pro Trp Phe Trp Ser Gly Glu Gln Val Asp Ile Glu Ala Gly Ile Gly
565 570 575
Glu Glu Ala Arg Pro Gly Ala Glu Glu Glu Thr Ile Phe Gly Ser Trp
580 585 590
Phe Trp Ala Glu Asn Gln Thr Tyr Met Asp Cys Arg Ala Glu Thr Ser
595 600 605
Cys Asp Thr Met Gln Gly Ala Glu Glu Glu Pro Ile Ile Gly Ser
610 615 620
Trp Phe Trp Thr Arg Val Glu Ala Cys Val Glu Gly Asp Val Asn Ser
625 630 635 640
Lys Ser Ser Leu Glu Asp Lys Glu Glu Ala Met Ile Pro Cys Phe Gly
645 650 655
Ala Lys Glu Glu Val Ser Met Lys His Gly Thr Gly Val Arg Cys Arg
660 665 670
Phe Met Ala Gly Ala Glu Glu Thr Asn Asn Lys Ser Cys Phe Trp Ala
675 680 685
Glu Lys Glu Pro Cys Met Tyr Pro Ala Gly Gly Gly Ser Trp Lys Ser
690 695 700
Arg Pro Glu Glu Glu Glu Asp Ile Val Asn Ser Trp Phe Trp Ser Arg
705 710 715 720
Lys Tyr Thr Lys Pro Glu Ala Ile Ile Gly Ser Trp Leu Trp Ala Thr
725 730 735
Glu Glu Ser Asn Ile Asp Gly Thr Gly Glu Lys Ala Lys Leu Leu Thr
740 745 750
Glu Glu Glu Thr Ile Ile Asn Ser Trp Phe Trp Lys Glu Asp Glu Ala
755 760 765
Ile Ser Glu Ala Thr Asp Arg Glu Glu Ser Arg Pro Glu Ala Glu Glu
770 775 780
Gly Asp Ile Val Gly Ser Trp Phe Trp Ala Gly Glu Glu Asp Arg Leu
785 790 795 800
Glu Pro Ala Ala Glu Thr Arg Glu Glu Asp Arg Leu Ala Ala Glu Lys
805 810 815
Glu Gly Ile Val Gly Ser Trp Phe Gly Ala Arg Glu Glu Thr Ile Arg
820 825 830
Arg Glu Ala Gly Ser Cys Ser Lys Ser Ser Pro Lys Ala Glu Glu Glu
835 840 845
Glu Val Ile Ile Gly Ser Trp Phe Trp Glu Glu Glu Ala Ser Pro Glu
850 855 860
Ala Val Ala Gly Val Gly Phe Glu Ser Lys Pro Gly Thr Glu Glu Glu
865 870 875 880
Glu Ile Thr Val Gly Ser Trp Phe Trp Pro Glu Glu Glu Ala Ser Ile
885 890 895
Gln Ala Gly Ser Gln Ala Val Glu Glu Met Glu Ser Glu Thr Glu Glu
900 905 910
Glu Thr Ile Phe Gly Ser Trp Phe Trp Asp Gly Lys Glu Val Ser Glu
915 920 925
Glu Ala Gly Pro Cys Cys Val Ser Lys Pro Glu Asp Asp Glu Glu Met
930 935 940
Ile Val Glu Ser Trp Phe Trp Ser Arg Asp Lys Ala Ile Lys Glu Thr
945 950 955 960
Gly Thr Val Ala Thr Cys Glu Ser Lys Pro Glu Asn Glu Glu Gly Ala
965 970 975
Ile Val Gly Ser Trp Phe Glu Ala Glu Asp Glu Val Asp Asn Arg Thr
980 985 990
Asp Asn Gly Ser Asn Cys Gly Ser Arg Thr Leu Ala Asp Glu Asp Glu
995 1000 1005
Ala Ile Val Gly Ser Trp Phe Trp Ala Gly Asp Glu Ala His Phe

```
                    1010                     1015                     1020
Glu  Ser   Asn  Pro  Ser  Pro  Val   Phe  Arg  Ala  Ile  Cys   Arg  Ser  Thr
     1025                     1030                     1035
Cys  Ser   Val  Glu  Gln  Glu  Pro   Asp  Pro  Ser  Arg  Arg   Pro  Gln  Ser
     1040                     1045                     1050
Trp  Glu   Glu  Val  Thr  Val  Gln   Phe  Lys  Pro  Gly  Pro   Trp  Gly  Arg
     1055                     1060                     1065
Val  Gly   Phe  Pro  Ser  Ile  Ser   Pro  Phe  Arg  Phe  Pro   Lys  Glu  Ala
     1070                     1075                     1080
Ala  Ser   Leu  Phe  Cys  Glu  Met   Phe  Gly  Gly  Lys  Pro   Arg  Asn  Met
     1085                     1090                     1095
Val  Leu   Ser  Pro  Glu  Gly  Glu   Asp  Gln  Glu  Ser  Leu   Leu  Gln  Pro
     1100                     1105                     1110
Asp  Gln   Pro  Ser  Pro  Glu  Phe   Pro  Phe  Gln  Tyr  Asp   Pro  Ser  Tyr
     1115                     1120                     1125
Arg  Ser   Val  Gln  Glu  Ile  Arg   Glu  His  Leu  Arg  Ala   Lys  Glu  Ser
     1130                     1135                     1140
Thr  Glu   Pro  Glu  Ser  Ser  Ser   Cys  Asn  Cys  Ile  Gln   Cys  Glu  Leu
     1145                     1150                     1155
Lys  Ile   Gly  Ser  Glu  Glu  Phe   Glu  Glu  Leu  Leu  Leu   Leu  Met  Glu
     1160                     1165                     1170
Lys  Ile   Arg  Asp  Pro  Phe  Ile   His  Glu  Ile  Ser  Lys   Ile  Ala  Met
     1175                     1180                     1185
Gly  Met   Arg  Ser  Ala  Ser  Gln   Phe  Thr  Arg  Asp  Phe   Ile  Arg  Asp
     1190                     1195                     1200
Ser  Gly   Val  Val  Ser  Leu  Ile   Glu  Thr  Leu  Leu  Asn   Tyr  Pro  Ser
     1205                     1210                     1215
Ser  Arg   Val  Arg  Thr  Ser  Phe   Leu  Glu  Asn  Met  Ile   Arg  Met  Ala
     1220                     1225                     1230
Pro  Pro   Tyr  Pro  Asn  Leu  Asn   Ile  Ile  Gln  Thr  Tyr   Ile  Cys  Lys
     1235                     1240                     1245
Val  Cys   Glu  Glu  Thr  Leu  Ala   Tyr  Ser  Val  Asp  Ser   Pro  Glu  Gln
     1250                     1255                     1260
Leu  Ser   Gly  Ile  Arg  Met  Ile   Arg  His  Leu  Thr  Thr   Thr  Thr  Asp
     1265                     1270                     1275
Tyr  His   Thr  Leu  Val  Ala  Asn   Tyr  Met  Ser  Gly  Phe   Leu  Ser  Leu
     1280                     1285                     1290
Leu  Ala   Thr  Gly  Asn  Ala  Lys   Thr  Arg  Phe  His  Val   Leu  Lys  Met
     1295                     1300                     1305
Leu  Leu   Asn  Leu  Ser  Glu  Asn   Leu  Phe  Met  Thr  Lys   Glu  Leu  Leu
     1310                     1315                     1320
Ser  Ala   Glu  Ala  Val  Ser  Glu   Phe  Ile  Gly  Leu  Phe   Asn  Arg  Glu
     1325                     1330                     1335
Glu  Thr   Asn  Asp  Asn  Ile  Gln   Ile  Val  Leu  Ala  Ile   Phe  Glu  Asn
     1340                     1345                     1350
Ile  Gly   Asn  Asn  Ile  Lys  Lys   Glu  Thr  Val  Phe  Ser   Asp  Asp  Asp
     1355                     1360                     1365
Phe  Asn   Ile  Glu  Pro  Leu  Ile   Ser  Ala  Phe  His  Lys   Val  Glu  Lys
     1370                     1375                     1380
Phe  Ala   Lys  Glu  Leu  Gln  Gly   Lys
```